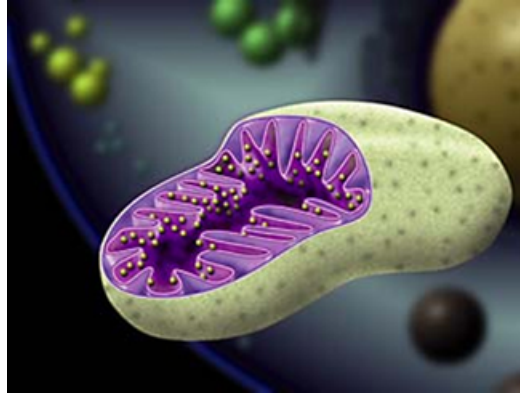


Cell Parts

Organelle - "tiny organ" perform a specialized job within the cell

Nuclear envelope/membrane - a semi-permeable membrane that surrounds and protects the nucleus

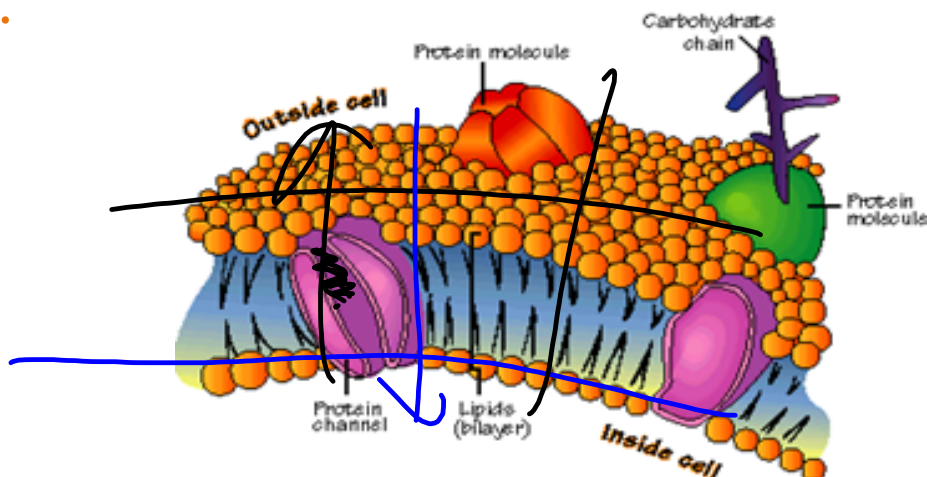
Mitochondria - This is where cellular respiration takes place and energy is provided to the organism.
Also known as the "POWER PLANT" of the cell



Lysosome - known as "suicide sacs" contain digestive enzymes that breakdown food, help digest wastes and worn out cells parts

Semi permeable

The **cell membrane** - it controls the movement of materials in and out of the cell.



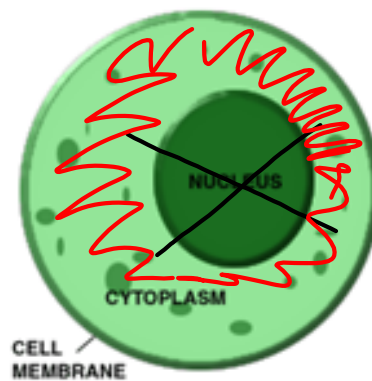
Golgi Complex/Bodies/Apparatus

a storage and packaging facility for proteins

Vacuole - fluid filled storehouse that contain water, food, CO₂ and wastes

The **cytoplasm** is a jelly-like material that supports the nucleus and the other organelles.

1



The **nucleus** acts as the control center for the cell - where DNA is found
genetic material



Nucleolus - small dense region within the nucleus where ribosomes are first assembled (but scientists are not 100% sure about this)

The **endoplasmic reticulum** is a series of canals that transports materials (proteins) to different parts of the cell, assemble parts of the cell membrane, breakdown drugs



Rough Endoplasmic Reticulum has ribosomes attached. Smooth E.R. does not.

Ribosomes - make/assemble proteins from amino acids which are required for cell growth and reproduction

Chloroplasts contain the green pigment chlorophyll... the site of photosynthesis.

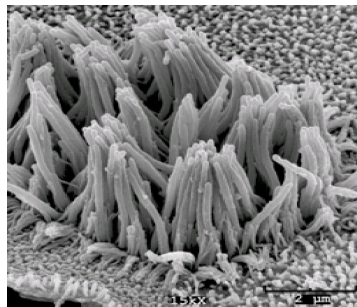
Cell wall is made of cellulose and provides protection and support for the plant cell.

Centriole is a small protein that chromosomes attach to in cell division of an animal cell

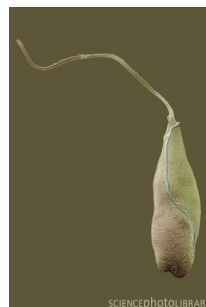
- Cytoskeleton – a network of protein filaments that give a cell its shape
- *straw like* Microtubules and *hair like* microfilaments make up the cytoskeleton



Cilia are tiny hair-like structures that help transport materials in certain cells.



Flagella are thread-like fibers (tails) that propel certain cells (ex. sperm)



<https://www.youtube.com/watch?v=1Z9pqST72is>

<http://www.bozemanscience.com/a-tour-of-the-cell>

The Cell Chapter 7 Pages 169 to 181

1. Explain the contributions of Hooke, van Leeuwenhoek, Schleiden, Schwann and Virchow to the development of the cell theory. (use time line)
2. Explain the difference between prokaryotic and eukaryotic cells.
3. List 4 differences between a plant and an animal cell.